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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/038,036	01/02/2002	Edward T. Grochowski	42P13133	7060

8791 7590 05/17/2005

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EXAMINER

KIM, KENNETH S

ART UNIT PAPER NUMBER

2111

DATE MAILED: 05/17/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/038,036

Applicant(s)

GROCHOWSKI ET AL.

Examiner

Kenneth S. KIM

Art Unit

2111

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

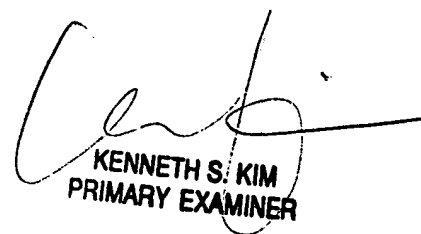
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 25 April 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-11 and 23-25 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-11 and 23-25 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

  
KENNETH S. KIM  
PRIMARY EXAMINER

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_

Art Unit: 2111

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on *April 25, 2005* has been entered.

1. Claims 1- 11 and 23-25 remain for examination.

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claims 5-9 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 5, "said parsing" lacks antecedent basis.

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

5. Claims 1-11 and 23-25 are rejected under 35 U.S.C. 102(b) as being anticipated by Narad, U.S. Patent No. 5,287,503.

Narad teaches the invention as claimed in claim 1 including a method comprising:

- (a) simultaneously reading original values from a plurality of registers (register comprising multiple single bit registers; col. 1, line 41),
- (b) determining results of a dependency producing instruction (col. 1, lines 34 and 35),
- (c) determining a select number of registers to be modified in the plurality of registers based on the dependency producing instruction (col. 1, lines 37 and 38),
- (d) modifying a subset of values in the select number of registers with architecturally correct values comprised of the results of the dependency producing instructions (col. 1, line 42),
- (e) simultaneously writing the original values and the architecturally correct values to the plurality of registers (col. 1, line 43), and

further teaches as in claims 2-11,

- (f) collectively reading and writing entire set of values (values in the register) – claims 2 and 3,
- (g) reading values from predicate or NaT registers (can be any register) – claims 3, 10, 4, and 11,
- (h) parsing Itanium instruction to select one, two, 48, and 63 registers (can be any type of instruction and any number of single bit registers) – claims 5-9.

The computer program product claims 23-25 are equivalently rejected based on the same reason.

6. Claims 1 and 23 are rejected under 35 U.S.C. 102(b) as being anticipated by Bluhm. U.S. Patent No. 5,937,178.

Bluhm teaches the invention as claimed in claim 1 including a method comprising:

- (a) simultaneously reading original values from a plurality of registers (ECX comprising ECH and ECL; col. 7, line 45),
- (b) determining results of a dependency producing instruction (stored result is used by other instructions; col. 7, line 42),
- (c) determining a select number of registers to be modified in the plurality of registers based on the dependency producing instruction (col. 7, line 49),
- (d) modifying a subset of values in the select number of registers with architecturally correct values comprised of the results of the dependency producing instructions (col. 7, line 47),
- (e) simultaneously writing the original values and the architecturally correct values to the plurality of registers (col. 7, line 57),

The program product claim 23 is equivalently rejected based on the same reason.

7. Applicant's arguments filed April 25, 2005 have been fully considered but they are not persuasive.

Applicant argued that references teaching read-modify-write operations do not teach dependency producing instructions.

Considering that all data values stored are at some point used by other instructions, instructions whose results are stored are therefore dependency-producing instructions. As such, all instructions that perform read-modify-write operation are dependency-producing instructions.

8. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Sholander et al taught a method of using read-modify-write for bit instructions.

Chapman taught a method of using read-modify-write operation.

Morris et al taught a method of using predicate registers, with individually readable bit registers, readable broadly as one register.

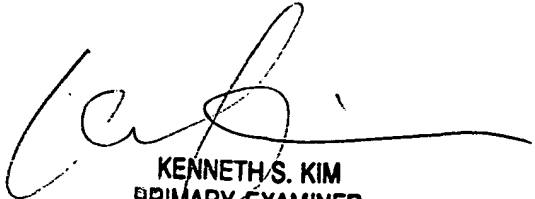
9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kenneth S KIM whose telephone number is (571) 272-3627. The examiner can normally be reached on M-F (8:30-17:00).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mark Rinehart can be reached on (571) 272-3632. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9306 for regular communications and (703) 872-9306 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (571) 272-2100.

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May 13, 2005



KENNETH S. KIM  
PRIMARY EXAMINER